

EXHIBIT 39

DECLARATION OF MARI OSTENDORF

I, Mari Ostendorf, declare as follows:

1. I am the Vice Provost for Research at the University of Washington (“the University”) in Seattle, Washington. I have held that position since September 2021. Prior to holding this position, I served as Associate Vice Provost for Research since 2017.

2. I have personal knowledge of the contents of this declaration, or have knowledge of the matters based on my review of information and records gathered by University of Washington personnel, and could testify thereto.

3. The University of Washington receives substantial annual funding from the National Science Foundation (“NSF”). In Fiscal Year 2024 (the last full fiscal year), the University received \$149 million in awards from NSF (\$104 million in grants and \$45 million in cooperative agreements), of which \$112 million was received directly from NSF and \$37 million came through incoming subcontracts. During that same period, the University spent the following sums on sponsored projects from NSF: ~\$122 million on 884 grants and ~\$39 million on 23 cooperative agreements.

4. The University of Washington intends to apply for new funding awards, and/or renewals and continuations of existing funding awards, in the next year and in future years to come.

5. The funding that the University of Washington receives from NSF supports critical and cutting-edge research vital to our nation’s security and economic competitiveness. Millions of Americans benefit from and depend on this research. For example:

- a. Research in Artificial Intelligence (AI) is critical for maintaining U.S. economic competitiveness, and for national security. The University of Washington has a

number of NSF-funded research efforts covering the spectrum of AI, from foundational to application driven, through individual investigator grants and involvement in AI Institutes. As a partner in the AI Institute for Foundations of Machine Learning, the University is contributing to new algorithms that can help machines learn on the fly, change expectations as they encounter objects, and bounce back from attempts by adversaries to manipulate datasets. As part of the NSF AI Institute for Agent-based Cyber Threat Intelligence and Operation, UW researchers are developing intelligent agents with a complex knowledge representation to more effectively identify and quickly respond to security threats to mission-critical systems. The University is also the lead site of the AI Institute for Dynamic Systems, which is developing transformative AI-enabled science and engineering technologies in a range of applications, from aerospace autonomy and control to advanced materials design. Finally, the University also leads the Accelerated AI Algorithms for Data-Driven Discovery Institute, which pioneers real-time AI solutions for latency-critical high-throughput challenges spanning subatomic particles, human-scale brain-machine interfaces in neuroscience, and cosmic-scale gravitational wave astronomy, enabling innovative AI/ML control systems for critical emerging technologies.

- b. Another research area that is critical for nation economic leadership and security is quantum information science and engineering (QISE). In this second quantum revolution, dubbed Quantum 2.0, society will leverage the quantum-mechanical properties of light and matter to enable new technologies in

computation, communication, and sensing. Again, the University of Washington has a number of NSF-funded research efforts in this critical area. Major areas of research include materials to enable quantum technologies, harnessing quantum in device engineering, and algorithms inspired by or exploiting quantum phenomena. The Molecular Engineering Materials Center is developing new quantum materials and technological capabilities, with experimental work supported by AI-driven discovery. In the Center for Integration of Modern Optoelectronic Materials (IMOD), researchers are developing the chemistry and device engineering of colloidal quantum dots, creating the nanoscale building blocks needed for an all optical quantum internet and next-generation data center computing. The research in these and other quantum centers is supported by the NSF-funded NNCI Northwest Nanotechnology Infrastructure site, which provides world-class nanotechnology infrastructure. The QISE research efforts in multiple centers are integrated with workforce development programs, training the next generation of scientists and engineers who will enable the quantum revolution, notably including U.S. military veterans and service members. An NSF-funded training program -- Accelerating Quantum-Enabled Technologies -- augments the center efforts, providing a unique research training curriculum that bridges the gap from physics and chemistry to multiple engineering departments, one of the first programs to bring hardware and software scientists and engineers together at the trainee level with hands-on lab opportunities.

- c. Another research area of great importance to the US, and supported by NSF, is semiconductor technology. The IMOD Center, NNCI Northwest Nanotechnology Infrastructure site, and individually-funded investigators contribute to this important research. In addition, UW is leading a workforce and research partnership (UPWARDS) that includes 11 universities across the U.S. and Japan, with support from NSF, Micron and Tokyo Electron. The program aims to train 5,000 students annually in semiconductor research. With over \$250 billion in U.S. semiconductor investments and 160,000 new jobs projected by 2032, initiatives like UPWARDS are essential to meet the demand for skilled workers.
- d. The NSF-funded RAPID Facility at the University of Washington directly benefits American prosperity and security by enhancing the nation's resilience to the increasing threat of natural hazards. By equipping researchers nationwide with critical tools and support services, the RAPID Facility fuels the development of more accurate infrastructure models, informs public policies that mitigate risks, and dramatically improves the nation's reconnaissance capabilities. Since 2018, the RAPID Facility has deployed equipment and/or staff on more than 200 individual post-event deployments. This vital research not only contributes to significant cost savings – with every dollar invested in resilience yielding a thirteen-fold return – but also includes a crucial component of training US citizens in cutting-edge technologies for hazard mitigation and infrastructure, strengthening both our economy and our ability to safeguard our communities.

- e. In addition to having more resilient infrastructure and more effective natural disaster recovery, researchers at the University of Washington are working to better understand the drivers of Earth's global patterns so as to better predict risks of natural threats, from tracking seismic activity worldwide to understanding threats of flooding and storm surge on coastal communities to predicting ecosystem impacts on the food chain. This information is essential for human safety as well as economic well-being.
- f. Many University of Washington startups have resulted from NSF research funding and/or SBIR/STTR funding from NSF, which is critical for bootstrapping early-stage companies. Examples from three different sectors are: Wayfinder, which offers K-12 Core Curriculum and tools to advance education and empower strong school communities; Olis Robotics, which currently supports more than 50% of the global installed industrial robot market base by enabling remote monitoring, control, and troubleshooting of new and legacy industrial robots; and A-alpha Bio, which develops precision-engineered biologics to address the most complex therapeutic challenges.

6. Reimbursement of the University of Washington's indirect costs is essential for supporting this research. NSF's cutting of indirect cost rates to 15% would preclude carrying out the kinds of research projects described in paragraph 5 in the future.

7. Indirect costs include constructing and maintaining state-of-the-art laboratories and other facilities required to meet the current technical requirements of advanced research, and procurement and maintenance of equipment necessary to conduct such research, such as specialized testing environments, precision instrumentation and laboratory safety systems.

Without this critical infrastructure, we simply cannot conduct the research. The University of Washington invests in facilities to conduct the federal government's research work, in anticipation of recovering reimbursement from the costs it bears in investing in those facilities, equipment and the infrastructure needed for funds from projected future research.

8. For example, with respect to the areas of research described in Paragraph 4:
 - a. Research in AI requires high-performance GPU computing resources in order to develop and experiment with state-of-the-art models. While researchers could use cloud computing, the cost for priority access to more powerful computers is high. Further, having UW-maintained facilities makes it possible to provide a trainee-supportive environment with scaffolding to move students from education to research. To support this important work, the University of Washington has been investing annually in infrastructure for high performance computing and this year invested \$10 million in a new facility to launch in Fall 2025, with the anticipation of operational costs being covered through grant-supported usage fees.
 - b. Research in quantum and semiconductor technology requires sophisticated facilities for experimentation, including fabrication and measurement. With the intention of supporting research on critical and emerging technologies, the University of Washington has made substantial facilities investments. In 2017, the University completed a \$37 million renovation of the Washington Nanofabrication Facility, resulting in 15,000 sf of ISO Certified Class 5, 6, and 7 cleanrooms. That same year, an \$87.8 million nanoengineering and sciences building opened, providing approximately 8,300 sf of learning space and

43,000 sf of research space, including 15,000 sf specifically designed to house vibration and electromagnetic interference sensitive equipment.

9. Physical facilities costs are one of the largest components of indirect costs. This includes not only the usual costs of constructing and maintaining buildings where research occurs, but the very high costs of outfitting and maintaining specialized laboratory space, which can require special security, advanced HVAC systems, and specialized plumbing, electrical systems and waste management, as well as specialized laboratory equipment. The features and amount of space available to researchers have a direct and obvious impact on the nature and amount of research that can be done at the University of Washington. The proposed reduction in indirect cost recovery will put current facility improvement and development at risk, including a new quantum research facility. In addition, the reduced indirect cost recovery will jeopardize the university's ability to expand AI computing due to the increased utilities costs associated with AI computing and to expand capabilities to support applications requiring restricted access. With reduced cost recovery for facility operations, some laboratories would have to be closed.

10. In addition, indirect costs fund the administration of awards, including staff who ensure compliance with a vast number of regulatory mandates from agencies such as NSF. These mandates serve many important functions, including ensuring research integrity; protecting research subjects; properly managing and disposing of chemical and biological agents and other materials used in research; managing specialized procurement and security requirements for sensitive research; managing funds; preventing technologies and other sensitive national security information from being inappropriately accessed by foreign adversaries; providing the high level of cybersecurity, data storage, and computing environments mandated for regulated data; ensuring compliance with specialized security protocols and safety standards; maintaining facility

accreditation and equipment calibration to meet research quality and security standards; and preventing financial conflicts of interest.

11. Recovery of the University of Washington's indirect costs is based on predetermined rates that have been contractually negotiated with the federal government.

12. The negotiated indirect cost rates at the University of Washington vary depending on the activity type, location, and budget period. Research activities at different locations have higher or lower rates depending on facilities requirements, or if associated with a Navy University-affiliated research center where administrative costs are budgeted as direct costs. Roughly 86% of indirect costs involve research located on the main campus for which the fiscal year 2025 rate is 55.5%, per an agreement dated 6/26/2024. The full listing of indirect cost rates is available at: <https://www.washington.edu/research/institutional-facts-and-rates/#fa-rates-table>.

13. The effects of a reduction in the indirect cost rate to 15% would be devastating. Of the \$~161 million in NSF funding that the University of Washington received associated with Fiscal Year 2024 expenditures, approximately \$128 million consisted of payment of direct costs, and \$33 million consisted of reimbursement of indirect costs. In Fiscal Year 2025, the University of Washington projects expenditures of \$140 million in NSF funding for direct costs and \$35 million in NSF funding for indirect costs. Based on awards and expenditure trends over the past five years, the University of Washington anticipates receiving an average of \$152 million from the NSF for annual direct costs in subsequent years. Based on the predetermined indirect cost rates that were agreed upon by the federal government as of 6/26/2024, and applying that rate to the direct costs (as modified pursuant to the CFR), the University reasonably expects to receive approximately \$39 million in indirect cost recovery on an annual basis over the next five years.

14. If—contrary to what the University of Washington has negotiated with the federal government—the indirect cost rate was reduced to 15% for new awards, that would reduce the University of Washington’s anticipated annual indirect cost recovery by \$27 million, to \$12 million.

15. This reduction would have deeply damaging effects on the University of Washington’s ability to conduct research from day one. Many of the University’s current research projects will be forced to ramp down if we cannot apply for renewals at the previously negotiated rate. This will also necessarily and immediately result in staffing reductions to curtail our spending on this research for which we expected reimbursement. For example:

- a. The University of Washington has recently expanded the number of compliance staff in the areas of research and security and export control, and it will be impossible to maintain a sufficient number of these positions with the proposed 15% indirect cost rate. Moreover, recruiting staff who have the requisite knowledge and experience to work in this area is exceedingly difficult. Even if funding were later restored, it would be difficult to find qualified individuals to fill these positions.
- b. The University of Washington is currently developing a restricted access computing enclave to support research with sensitive data. With the proposed 15% indirect cost rate, we will not be able to support the staff with the specialized knowledge to maintain the security of this facility.

16. Should the indirect cost reimbursement be limited to 15%, the University would be required to dramatically decrease its support for the federal government's research portfolio as it could no longer rely on reimbursement of the cost associated with conducting it.

17. The University of Washington has for decades relied on the payment of indirect costs. And until now, we have been able to rely on the well-established process for negotiating indirect cost rates with the government to inform our budgeting and planning. Operating budgets rely on an estimate of both direct and indirect sponsored funding to plan for annual staffing needs (*e.g.*, post-docs, PhD students, and other research staff), infrastructure support (*e.g.*, IT networks, regulatory compliance, and grant management support), and facility and equipment purchases. And in some cases, the University has long-term obligations—for example, PhD students are typically accepted with multi-year commitments of support. In 2024, over 650 graduate students chose to come to the University of Washington, and more than 500 new students are expected to join this fall. This commitment relies on budgeted grant funding, including associated indirect cost recovery, to fulfill these commitments. This multi-year budgeting process also assumes the availability or possibility of grant renewals at roughly similar terms – and certainly at the negotiated indirect cost rate – as had been previously available. The graduate students who are able to continue without support will not have the same research opportunities due to lack of availability of funds to support experimental work.

18. In addition to the immediate effects and reliance interests described above, dramatically cutting indirect cost reimbursement would have longer-term effects that are both cumulative and cascading. In addition to the lost opportunity for advancing science and technology to maintain American competitiveness, the country's current workforce needs will not be met, let alone the future needs. The nation will lose the talent of students trained to work with and contribute to critical and emerging technologies that are vital to our nation's security and economic competitiveness.

19. Disruptions to the University of Washington's research will also have negative effects in the Seattle area, the state of Washington, and the broader Pacific Northwest region. The University of Washington research enterprise contributes \$2.6B to the Washington state economy and supports 10,641 jobs statewide. In many of its NSF-funded projects, the University collaborates with state and local partners to help solve regional challenges through joint research and innovation. The University of Washington's research also fuels spending in the regional economy, including by driving discoveries that launch new ventures, attract private investment, and make a positive social impact. A massive reduction in the University of Washington's research budget would immediately and seriously jeopardize these contributions to the local region.

20. Finally, slowdowns or halts in research by the University of Washington and other American universities will allow competitor nations that are maintaining their investments in research to surpass the United States on this front, threatening both our Nation's national security and its economic dominance. In particular, universities are at the forefront of important research in critical and emerging technologies, and that research requires state-of-the-art facilities and staff to support the research needs of this work, both of which depend critically on indirect cost reimbursement.

21. The University of Washington cannot cover the funding gap itself. While the University of Washington maintains an endowment, it is neither feasible nor sustainable for the University of Washington to use endowment funds or other revenue sources to offset shortfalls in indirect cost recovery:

- a. The majority of the University of Washington's endowment—around 99%—is restricted to specific donor-designated purposes, such as scholarships, faculty

chairs, and academic programs. The University of Washington is not legally permitted to use those funds to cover research infrastructure costs.

- b. Even the portion of the endowment that is unrestricted is subject to a carefully managed annual payout, typically around 4.5% of the average market value of the endowment units for the past five years, to ensure long-term financial stability for the institution.

22. It is also not feasible or sustainable for the University of Washington to use other revenue sources to offset shortfalls in indirect cost recovery. As a non-profit institution, the University of Washington reinvests nearly all of its revenue into mission-critical activities, leaving little margin to absorb unexpected funding gaps. In other words, unlike for-profit organizations, the University of Washington does not generate significant surpluses that could be redirected without impacting core academic priorities such as educational programs and financial aid support for students. Absorbing the cost of a lower indirect cost rate, even if it were possible, would create long-term budget pressures on the University of Washington—which would in turn force reductions in key investments supporting the University of Washington’s faculty, students, staff, research, and teaching infrastructure, as well as other critical activities needed to maintain the University of Washington’s academic excellence. So even if the University of Washington could “cover” some of the indirect costs previously funded by NSF, it could do so only by negatively affecting other critical goals central to the institution’s mission.

23. If University of Washington researchers can no longer apply for NSF grants because it is unable to accept the new indirect cost rate cap – a risk that would impact 93% of our NSF grant expenditures – the harms described herein would be exacerbated. That greater loss in funding from NSF would mean more significant cost-cutting measures would need to be adopted—

and quickly. The University of Washington cannot “float” all of the indirect costs it would likely lose coverage for – nor could it float NSF grants altogether if it is not able to accept the 15% cap – so some research projects would need to be terminated altogether, and others would need to be scaled down or pared back significantly. The process of identifying these cuts would need to begin immediately, and layoffs, closures, and research pauses or contractions would follow soon thereafter. Cutting back on the University of Washington’s research in fields such as artificial intelligence, quantum information science and engineering, semiconductor and optical materials research, and infrastructure resilience will also have long-term implications on national security and the American economy.

I declare under penalty of perjury that the foregoing is true and correct.

Executed on May 5, 2025, at Seattle, Washington.

A handwritten signature in black ink, reading "Mari Ostendorf", written in a cursive style.

Mari Ostendorf